



A new project about intelligent maintenance and effective infrastructure management

The project INFRALERT, co-funded by the EU, takes off this month for three years of efforts towards enhancing the infrastructure performance in road and railway networks. With an overall budget of over €3 million, Project Coordinator Fraunhofer IVI and Technical Manager CEMOSA along with their partners will produce an expert-based information system to support and automate linear asset infrastructure management from measurement to maintenance.

The INFRALERT project officially starts on the 1st of May. It will call on the cutting-edge expertise of partners from 6 European countries. These include technological SMEs, research organisations and infrastructure managers. The project sets out to develop and demonstrate solutions that enhance the infrastructure performance and adapts its capacity to growing needs by:

- a) Ensuring service reliability and safety by minimising incidences and failures of decaying assets
- b) Keeping and increasing the availability by optimising operational maintenance interventions and strategic long-term decisions on new construction
- c) Ensuring the operability under traffic disruptions due to interventions.

The condition of the land transport infrastructure has a big societal and economic relevance, since constraints result in disruptions of service. The demand for surface transport will significantly increase in the next years. Given budget restrictions, a substantial enlargement of the road/rail network in the next decades is doubtful. Besides, the aging infrastructure will require more maintenance interventions which infer normal traffic operation. Therefore, the only way to increase infrastructure capacity for the increased transportation demand is to optimise the performance of the existing infrastructure. This is precisely the goal tackled by INFRALERT.

INFRALERT will deliver innovative expert-based data management and planning tools and will validate them in two real-world pilots chosen for their potential for replication: a railway network in Sweden and a road network in Portugal. In both cases, extensive data from auscultation campaigns are available since some years ago. The empirical development of the whole project will be based on these pilot cases.

In addition to technical development and demonstration, INFRALERT will ensure the widest impact possible through an ambitious dissemination and exploitation strategy. This includes workshops, newsletters, a website and clustering with related projects. The project team will be supported by an External Advisory Boards, composed by experts from the infrastructure community.

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INFRALERT is coordinated by Fraunhofer-Gesellschaft and developed in cooperation with 6 other partners: CEMOSA, DMA s.r.l., Regens Informatikai Reszvenytarsasag, Universidad de Sevilla, Lulea Tekniska Universitet, Estradas de Portugal S.A INFRALERT is co-financed by EU within the Horizon 2020 – the Framework Programme for Research and Innovation (2014-2020).